

## **Canada to Establish the Position of Chief Technology Officer (CTO)**

Technology and its ramifications play an increasing role in our lives. While some progress is being made, governments don't always react to the social and political impacts of technology, or how their decisions and new legislation affects innovation and our use of technology.

Currently, there is no designated office at the federal government level that can provide the much needed guidance to government with regard to technology trends and its potential impact on our country's competitiveness. Technology is changing rapidly and its complexity at times makes it difficult to understand what the ramifications of those changes are and how to respond to those changes. It can also make it difficult to understand the negative effects on our futures, business, and lifestyles that otherwise well intended legislation or policies might create. A failure to respond quickly or properly, such as enacting appropriate changes to intellectual property laws to facilitate the adoption of certain new technologies or ensuring the technology will produce the intended benefits - can result in a lost opportunity to enhance productivity, innovation and efficiency - all pillars of a sound economy.

Because of the rapidly evolving changes in technology over the last decade, countries that understand the trends and economic benefits of technology and that have embraced technology are countries that are forging a competitive advantage over countries that are lagging behind in this area.

Identifying and understanding trends in technology are critical for ensuring that governments have the right infrastructure, policies, services and legislation for the 21<sup>st</sup> century.

The Obama administration in the United States has recently appointed its first ever Chief Technology Officer (CTO). This appointment sends a clear message that the United States is committed to embracing technology. The CTO office is expected to play an important role in creating new levels of transparency and access to government agencies, guiding policies that stimulate growth, innovation, inter-operability of key government functions, communication and, above all, security.

Canada should appoint its own CTO, but with a mandate tailored to also guide government with regard to technology trends and how technology inter-relates with legislation and policy.

The general idea behind a Canadian CTO would be to have someone experienced and well-versed in science and technology issues, who understands current tools and trends in technology, where those trends may be headed, and how they may affect citizens and businesses.

Understanding that would lead to better legislation and policies on issues such as intellectual property, the Internet, new media, the environment, privacy and security. The CTO also would be able to help government put lobbying efforts by various groups in context. It also would help prevent the unintended consequences that can arise from legislation, and to avoid well-intentioned but misguided laws.

The CTO would help government interpret technology trends, understand how they affect practical issues, their ramifications and possibilities – then help create and implement policies that address and take advantage of those trends. The CTO would have no involvement in the procurement of technologies or associated resources and would be invaluable in streamlining the way government functions through efficiency and innovation. At a strategic level, the CTO would promote technological innovation to help achieve our country's most urgent priorities, from creating jobs and reducing the cost of government to keeping our nation safe. The CTO would work closely on a tactical level with the current federal CIO, to set tech policy and use technology to improve security, ensure transparency and lower costs.

The aim would be for government to seek the CTO's counsel on proposed legislation and policy of all types, help interpret it and put it in context. It is time for Canada to create its own leading-edge visions in technology and an environment that fosters and encourages the development and use of innovative technologies.

### **Recommendation**

That the federal government create a Chief Technology Officer position that would initially report in an advisory capacity to the Prime Minister and fill that position no later than October of 2010.